AMENDMENTS TO THE CLAIMS

Claims 1-12 (cancelled)

- 13. (currently amended): A method for stabilizing the nucleic acids of at least one cell in a sample, wherein said method comprises:
 - (a) adding to a vessel containing the sample, a composition comprising:
 - (i) a first substance having a concentration effective for precipitating or denaturing proteins, comprising at least one alcohol or ketone whose concentration is less than 80% of the total composition; and
 - dimethyl sulfoxide having a concentration effective for aiding in the infusion of the first substance into said at least one cell whose concentration is greater than 20% of the total composition, wherein the combined concentration of said first and second substances and dimethyl sulfoxide is equal to 100% of said composition
 - (b) contacting said at least one cell in said sample with said composition;
 - (c) incubating said sample with said composition for an effective period of time and at an effective temperature; and
 - (d) obtaining said at least once cell with stabilized nucleic acids in said sample.
- 14. (original) The method of Claim 13 wherein said at least one alcohol or ketone is selected from the group consisting of methanol, ethanol, propanol, isopropanol, butanol and acetone.
 - 15. (cancelled)
- 16. The method of Claim 13 wherein said first substance is comprised of one alcohol or ketone.
 - 17. (cancelled)

- 18. (original) The method of Claim 13 wherein said first substance is comprised of a first alcohol or ketone and a second alcohol or ketone.
- 19. (currently amended) The method of Claim 18 wherein said concentrations of said first and second substances and DMSO in said composition are in a ratio of 2.5:2.5:5 (first alcohol or ketone : second alcohol or ketone : second substance DMSO)
 - 20. (cancelled)
- 21. (currently amended) The method of Claim 16 wherein said first substance is methanol-and said second substance is dimethyl sulfoxide.
- 22. (currently amended) The method of Claim 19 13 wherein said first substance comprises both methanol and ethanol alcohol or ketone is methanol, said second alcohol or ketone is ethanol and said second substance is dimethyl sulfoxide.
- 23. (currently amended) The method of Claim 16 wherein said first substance is ethanol-and-said second substance is dimethyl sulfoxide.
 - 24. (cancelled)
 - 25. (original) The method of Claim 13 wherein said nucleic acid is DNA.
 - 26. (original) The method of Claim 13 wherein said nucleic acid is RNA.
 - 27. (original) The method of Claim 26 wherein said RNA is ribosomal RNA.
- 28. (original) The method of Claim 13 wherein said effective period of time is from about one to four days.

- 29. (original) The method of Claim 13 wherein said effective temperature is room temperature.
- 30. (original) The method of Claim 13 wherein said effective temperature is from about 0° to 40° C.
- 31. (original) The method of Claim 13 wherein said at least one cell is a prokaryote or eukaryote.
- 32. (original) The method of Claim 13 wherein said at least one cell is a microorganism.